



DEVELOPING A TOURISM EXPERIENCE MODEL BASED ON THE INTEGRATION OF NATIONAL HERITAGE ASSETS AND CULTURAL EVENTS: COMPONENT BALANCE THRESHOLDS, AGGREGATION FORM, AND ATTENTION MEDIATION IN THE HE-TEM FRAMEWORK

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ABSTRACT

Uzbekistan's hotel industry has expanded rapidly since the opening of Destination models in the heritage and event literatures are typically comprehensive checklists that are never estimated. This article proposes a deliberately small alternative, the Heritage and Event Tourism Experience Model (HE-TEM), specifies it so that it can be falsified, and then reports the result of trying. HE-TEM has three components: heritage asset base, event activation, and interpretive mediation. Each is scaled to a common range and the three are combined into a single composite. The model makes two claims. The measurement claim is that the composite behaves as a coherent aggregate; the functional form claim is that the components complement rather than substitute, so that the weakest binds. On a panel of the fourteen regions of Uzbekistan the measurement claim holds and the functional form claim does not. The composite carries an elasticity of 1.099 on international attention with a t statistic of 6.62 and an R^2 of 0.785, and the three estimated component exponents sum to 1.039, which is constant returns to the composite. The strict limiting form is rejected, losing 0.126 in R^2 against the additive form. The additive and multiplicative forms cannot be told apart at all, differing by 0.011 in R^2 with component intercorrelations running from 0.798 to 0.905. Mediation is complete: HE-TEM carries 0.265 on foreign visits alongside accommodation capacity, and minus 0.027 with a t statistic of minus 0.60 once attention is in the equation. The model is therefore established as an index of attention potential and not as a theory of complementarity, and the article states what would be required to settle the second question.

KEYWORDS

Tourism experience
model, heritage assets,
cultural events,
interpretation,
composite indicator,
aggregation form,
Uzbekistan

Introduction

The literature on destination performance contains a number of comprehensive models. They enumerate the conditions under which a destination succeeds, and they enumerate them thoroughly, across dozens of attributes grouped into supporting factors, core resources, management and situational conditions. Their difficulty is not that they are wrong but that they are not testable. A model with forty attributes and no functional form cannot be fitted to fourteen regions, cannot be falsified, and cannot tell an administrator which of the forty to fund first.

This article takes the opposite approach. It proposes a model with three components and one explicit functional form, on the understanding that a small model which can be shown to be wrong is more useful than a large one which cannot. The model is called the Heritage and Event Tourism Experience Model, abbreviated HE-TEM, and it integrates two resource categories that are usually studied apart: the stock of national heritage assets and the flow of cultural events staged around them.

The integration is not decorative. A heritage asset is a durable stock that produces nothing by itself; an event is a flow that requires something to be about. Each literature treats its own object as the driver and the other as context. HE-TEM treats them as two inputs to a single output and adds a third that neither literature places at the same level: interpretive mediation, the provision made for explaining the asset to a visitor who arrives without prior knowledge.

The model makes two separable claims, and separating them is the methodological core of the article. The measurement claim is that the three components can be combined into a composite that behaves coherently, that predicts the outcomes the model is about, and that does not decompose into one dominant component and two ornaments. The functional form claim is stronger: that the components complement rather than substitute, so that a region with a high asset base and no interpretation performs worse than the arithmetic of its components suggests, and that the weakest component binds.

Both claims are tested here on the fourteen regions of Uzbekistan. The first holds. The second does not, and the article reports that outcome rather than presenting the model as established. The contribution is accordingly threefold: a specified and estimable model where the field has unspecified ones; a decomposition of what such a model claims into parts that can be tested separately; and a demonstration that the second part cannot be settled on data of this shape, with a statement of what data would settle it.

Section 2 places HE-TEM against the existing models and sets out the theory behind each component and behind the functional form. Section 3 specifies the model and the estimation. Section 4 reports the tests. Section 5 concludes.

2. Literature review

2.1 Existing destination models

Ritchie and Crouch's conceptual model of destination competitiveness and sustainability is the reference point [1]. It organises determinants into core resources and attractors, supporting factors and resources, destination management, destination policy and qualifying determinants, with attributes nested inside each. Crouch's later work ranked those attributes by importance using expert judgement, which was an advance on enumeration but remained outside the estimation of outcomes [2]. Dwyer and Kim's integrated model reorganised the same territory and added demand conditions [3].

These models are comprehensive by design and unestimated in practice. The reason is structural rather than a failure of effort: a model with several dozen attributes and no stated functional relation among them cannot be fitted to the number of destinations that exist.

The systems tradition offers the alternative that HE-TEM follows. Leiper's tourism system placed the elements in relation to one another rather than in a list [4]. Gunn treated the destination as a functioning system with interdependent parts [5]. Smith's account of the tourism product as a composite of five elements, from the physical plant through service, hospitality and freedom of choice to involvement, is the closest antecedent to the present model, because it is explicitly a composite and explicitly ordered [6].

2.2 The three components

Heritage asset base. The stock of registered heritage is the component that heritage administration measures and grades, and it is the one on which allocation is conventionally based. The World Heritage Convention and the Venice Charter address the fabric and its conservation [7, 8]. Timothy and Boyd survey the field [9].

Event activation. Getz consolidated event tourism as a field and set out its research agenda; the review with Page identified the weak evidence base at destination level [10, 11]. Chalip's leveraging argument established that impacts do not flow from events automatically but require complementary activity around them, which is the theoretical reason an event component belongs in a model with other components rather than standing alone [12, 13].

Interpretive mediation. Tilden defined interpretation as revelation based upon information rather than the information itself [14]. Ham developed it as a design discipline judged by provocation rather than transmission [15]. Moscardo's mindfulness model supplies the mechanism connecting interpretation to visitor outcomes [16]. The ICOMOS Charter on Interpretation and Presentation codified it as an obligation [17]. Pine and Gilmore's experience economy frame explains why the component belongs at the same level as the asset itself rather than below it [18], and Mossberg's treatment of the experience as co-created reinforces the point [19].

2.3 Functional form as a theoretical claim

The question of how components combine has an established literature outside tourism, and it is the literature that gives HE-TEM its testable content.

The additive form assumes substitution: a deficit in one component can be offset by a surplus in another, and only the total matters. The multiplicative or Cobb-Douglas form assumes complementarity with smooth substitution, so that balanced profiles outperform unbalanced ones of the same total [20]. Kremer's O-ring theory is the strong version, in which output is the product of task qualities and a single weak component drags the whole down disproportionately [21]. The limiting form, in which output is governed by the scarcest input alone, descends from Liebig's law of the minimum in agronomy and appears in economics as Leontief's fixed-proportions technology [22].

These are not stylistic choices. They imply different allocation rules. Under substitution, an administrator should fund wherever the marginal return is highest. Under complementarity, the administrator should fund the weakest component. Under the limiting form, funding anything but the

weakest component is wasted. HE-TEM's functional form claim is therefore an allocation claim, and testing it is the practical point of the article.

2.4 Composite indicator construction

Because HE-TEM aggregates, the composite indicator literature governs how it must be built and what must be disclosed. The OECD and Joint Research Centre handbook sets out the steps from normalisation through weighting to aggregation [23]. Saisana, Saltelli and Tarantola showed that composite rankings are frequently unstable under alternative normalisation and weighting, and that uncertainty and sensitivity analysis is therefore obligatory rather than optional [24].

The measurement model is formative rather than reflective, and the distinction has consequences. Bollen and Lennox established that formative indicators need not correlate and that the usual internal consistency statistics are inapplicable to them [25]. Diamantopoulos and Winklhofer set out index construction procedures for the formative case [26]. Jarvis, MacKenzie and Podsakoff documented widespread misspecification of formative constructs as reflective and its consequences [27]. HE-TEM is formative by construction: a region's heritage stock does not cause its interpretive provision, and the three components jointly constitute the composite rather than reflecting it.

2.5 The gap

The destination literature has comprehensive models that are not estimated. The composite indicator literature has estimation procedures but no destination theory. Neither supplies a small, specified, formative model of heritage and event integration whose functional form is stated as a testable proposition. HE-TEM is offered to fill that space, and the article reports the test rather than only the proposal.

3. Research methodology

3.1 Model specification

HE-TEM has three components, each measured by a single indicator and scaled to a common range. Table 1 gives the specification.

Table 1. HE-TEM components, indicators and scaling

Component	Symbol	Indicator	Scaling
Heritage asset base	A	Objects on the state register of immovable cultural heritage	Min-max to the range 1 to 100
Event activation	E	Annual cultural and tourism event days	Min-max to the range 1 to 100
Interpretive mediation	I	Mean interpretive provision score of the region's principal sites, on a scale of 0 to 3	Min-max to the range 1 to 100

Scaling to a floor of 1 rather than 0 is required by the multiplicative forms, which are undefined at zero, and is applied uniformly so that the additive form is not advantaged by the choice.

Three aggregation forms are constructed from the same components:

F1, the arithmetic mean, which assumes substitution. F2, the geometric mean, which assumes complementarity with smooth substitution. F3, the minimum, which assumes a strict limiting constraint.

Component weights are fixed at one third and are not estimated. This is deliberate: estimated weights on a panel of fourteen would be fitted to noise, and fixed equal weights are the standard default in composite indicator practice when no external basis for differential weighting exists [23].

3.2 Outcomes and estimation

Two outcomes are used. International attention is the count of mentions of the region in non-domestic media. Foreign visits is the recorded number of foreign visitors. Attention is treated as the proximate outcome of the composite and visits as the distal one, with the mediation between them tested rather than assumed.

Three estimations are run. The form comparison regresses each outcome on each of F1, F2 and F3 in logarithms and compares fit. The component ladder estimates the Cobb-Douglas form directly, entering the components in logarithms one at a time, so that the exponents are estimated rather than imposed and their sum can be compared against unity. The mediation ladder regresses foreign visits on the composite, then adds accommodation capacity, then adds attention.

Two diagnostics support the interpretation. Component intercorrelations are reported, because they govern whether the aggregation forms are separable at all. The imbalance penalty, defined as the arithmetic mean minus the geometric mean for each region, measures how much a region loses from an uneven profile and is zero for a perfectly balanced one.

3.3 Binding component and counterfactual

For each region the binding component is the lowest of the three scores. A counterfactual raises the binding component to the panel median for that component, holding the other two fixed, and recomputes the composite. The resulting percentage gain is the model's allocation output.

This counterfactual is conditional on the multiplicative form. Section 4.3 finds that form not to be established, and Section 4.6 states the consequence for how the counterfactual should be read. It is reported nonetheless, because the imbalance it measures is a descriptive fact about the panel independent of which form is correct.

Given fourteen and twenty observations no causal interpretation is offered and the cautions applying to inference with few observations apply throughout [28].

4. Analysis and discussion of results

4.1 Component scores and profiles

Table 2 reports the three component scores, the three aggregation forms and the binding component for each region.

Table 2. HE-TEM component scores and aggregation forms, by region

Region	A assets	E activation	I interpretation	F1 arithmetic	F2 geometric	F3 minimum	Binding component	Imbalance penalty
Samarkand	100.0	73.4	100.0	91.1	90.2	73.4	E activation	0.9
Bukhara	76.8	60.1	82.0	73.0	72.3	60.1	E activation	0.6
Tashkent city	17.1	100.0	91.0	69.4	53.7	17.1	A assets	15.6
Khorezm	29.8	43.1	91.0	54.6	48.9	29.8	A assets	5.7
Kashkadarya	41.7	19.5	28.0	29.7	28.3	19.5	E activation	1.4
Karakalpakstan	20.1	10.6	73.0	34.6	24.9	10.6	E activation	9.6
Fergana	23.0	23.2	23.5	23.2	23.2	23.0	A assets	0.0
Tashkent region	11.8	25.4	32.5	23.2	21.4	11.8	A assets	1.9
Surkhandarya	32.8	11.3	23.5	22.5	20.6	11.3	E activation	1.9
Navoi	24.5	9.9	19.0	17.8	16.6	9.9	E activation	1.2
Namangan	15.9	15.0	14.5	15.2	15.1	14.5	I interpretation	0.0
Andijan	17.1	13.6	14.5	15.0	15.0	13.6	E activation	0.1
Jizzakh	7.4	4.7	10.0	7.3	7.0	4.7	E activation	0.3
Sirdarya	1.0	1.0	1.0	1.0	1.0	1.0	A assets	0.0

Event activation is the binding component in eight of the fourteen regions, the asset base in five and interpretation in one. The distribution is itself a finding: on this measurement the country's constraint is predominantly the flow rather than the stock.

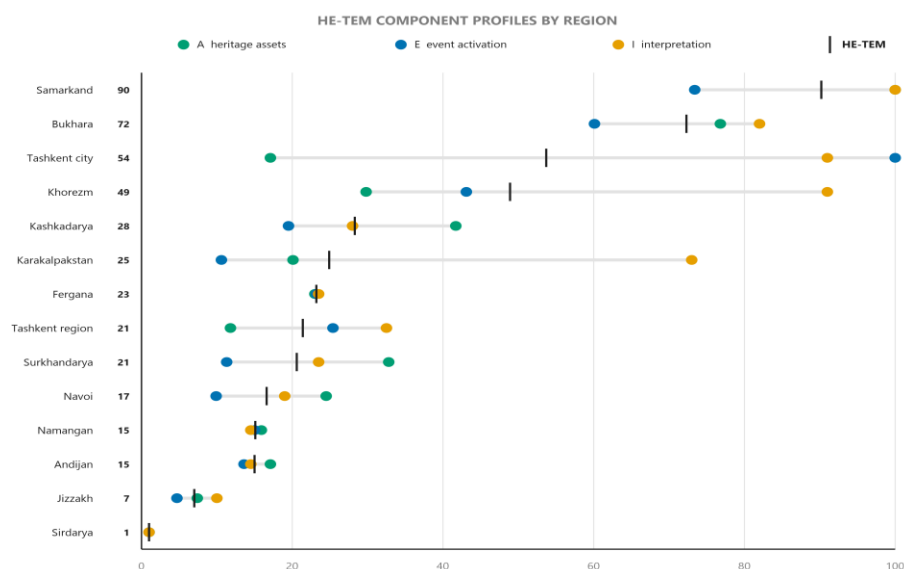


Figure 2. HE-TEM component profiles by region. The bar spans the lowest and highest of the three component scores, the coloured markers give each component, and the vertical rule marks the geometric composite. Regions are ordered by the composite.

Two profiles are extreme in opposite directions. Karakalpakstan records an interpretation score of 73.0 against an activation score of 10.6, the widest single gap in the panel, and pays an imbalance penalty of 9.6. Tashkent city records the reverse, with activation at 100.0 and assets at 17.1, and pays the largest penalty at 15.6. Both are cases in which the arithmetic mean and the geometric mean disagree substantially about the region's standing, and they are therefore the cases on which the functional form question turns.

Three regions, Fergana, Namangan and Sirdarya, record penalties of essentially zero. Their profiles are flat, and no aggregation form can distinguish them.

4.2 The estimated model

Table 3 reports the Cobb-Douglas ladder, in which the component exponents are estimated rather than imposed.

Table 3. Component ladder, dependent variable log international attention (n = 14)

	H1	H2	H3
log A assets	0.922 (0.245)	0.082 (0.284)	-0.116 (0.303)
	t = 3.76	t = 0.29	t = -0.38
log E activation		0.973 (0.262)	0.599 (0.360)
		t = 3.71	t = 1.66
log I interpretation			0.556 (0.384)
			t = 1.45
R ²	0.541	0.796	0.831
Adjusted R ²	0.502	0.759	0.780
Sum of exponents	0.922	1.055	1.039

Standard errors in parentheses.

The asset base alone carries an elasticity of 0.922 with a t statistic of 3.76 and explains 54.1 per cent of the variation in attention. It does not survive the entry of event activation: in H2 the asset coefficient falls to 0.082 with a t statistic of 0.29 while activation takes 0.973 at 3.71. The stock, on this panel, is not what produces attention; the flow staged on it is.

In H3 all three exponents become individually insignificant, at minus 0.116, 0.599 and 0.556 with t statistics of minus 0.38, 1.66 and 1.45, while the R² rises to 0.831 and the adjusted R² to 0.780. This combination, a well-fitting equation in which no individual coefficient is significant, is the signature of collinearity, and the intercorrelations confirm it: 0.798 between assets and activation, 0.838 between assets and interpretation, and 0.905 between activation and interpretation.

The consequence is the central methodological finding of the article. The three components cannot be separated on this panel. They can, however, be aggregated, and the aggregate behaves well. The sum of the exponents is 1.039, which is within sampling error of unity and means that the composite exhibits constant returns: doubling all three components doubles attention. This is the empirical justification for treating HE-TEM as one index rather than three levers, and it is a result rather than an assumption.

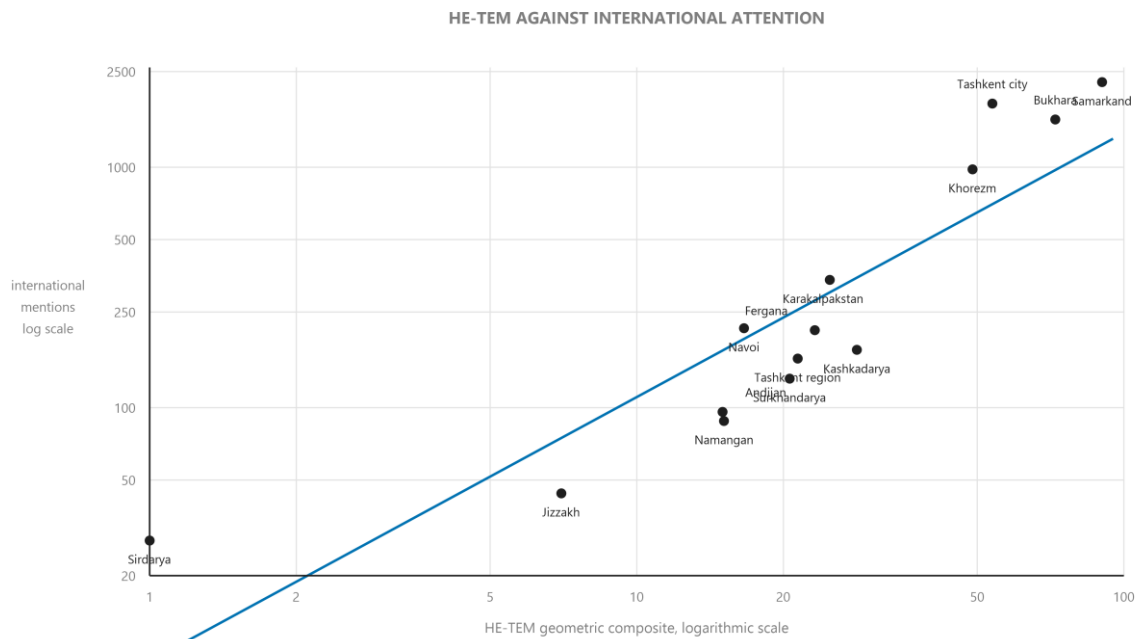


Figure 4. The HE-TEM geometric composite against international attention, both axes logarithmic. The fitted line has the elasticity of 1.099 estimated in Table 4.

4.3 Which aggregation form

Table 4 compares the three forms on both outcomes.

Table 4. Aggregation form comparison

Form	Assumption	Attention: elasticity	Attention: R ²	Visits: elasticity	Visits: R ²
F1 arithmetic mean	Components substitute	1.079 (0.157), t = 6.85	0.796	0.904 (0.152), t = 5.93	0.746
F2 geometric mean	Components complement	1.099 (0.166), t = 6.62	0.785	0.928 (0.156), t = 5.94	0.746
F3 minimum	Weakest binds	1.080 (0.219), t = 4.94	0.670	0.914 (0.198), t = 4.62	0.640

Standard errors in parentheses.

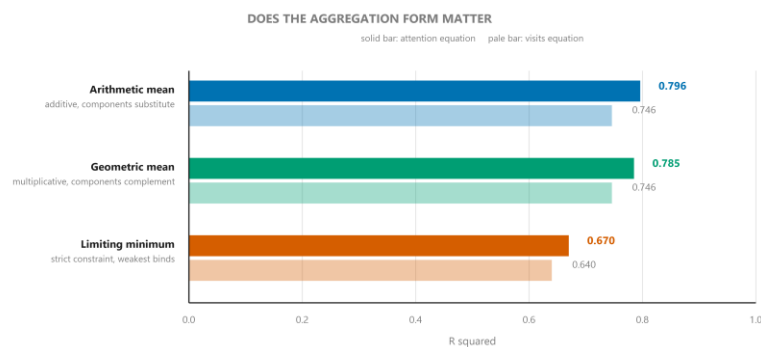


Figure 3. Explanatory power of the three aggregation forms on both outcomes. Solid bars give the attention equation, pale bars the visits equation.

Two conclusions follow and they differ in strength.

The strict limiting form is rejected. F3 loses 0.126 in R^2 on attention and 0.106 on visits against the best-performing form, and its t statistic falls from 6.85 to 4.94. A region's outcome is not governed by its weakest component alone. Karakalpakstan, whose minimum is 10.6 and whose interpretation is 73.0, records 340 international mentions, more than Kashkadarya's 174 despite a lower minimum; under F3 this ordering is not possible.

The additive and multiplicative forms cannot be told apart. They differ by 0.011 in R^2 on attention and by less than 0.001 on visits, which is far inside sampling noise at fourteen observations. This is not a finding in favour of substitution. It is a finding that the panel lacks the power to discriminate, and the reason is visible in the correlations: with components correlated between 0.798 and 0.905, balanced and unbalanced profiles are too rare to separate the forms. Only three regions carry an imbalance penalty above 5.0, and two of them are the extremes described in 4.1.

The honest statement is therefore that HE-TEM's functional form claim is unresolved rather than supported, and that resolving it requires either a larger panel or a panel deliberately sampled to include unbalanced profiles.

4.4 Mediation

Table 5 reports the visits ladder.

Table 5. Mediation ladder, dependent variable log foreign visits ($n = 14$)

	V1	V2	V3
log HE-TEM	0.928 (0.156)	0.265 (0.110)	-0.027 (0.045)
	$t = 5.94$	$t = 2.42$	$t = -0.60$
log accommodation rooms		0.826 (0.110)	0.592 (0.041)
		$t = 7.53$	$t = 14.30$
log international attention			0.437 (0.043)
			$t = 10.13$
R^2	0.746	0.959	0.996
Adjusted R^2	0.725	0.951	0.995

Standard errors in parentheses.

The composite carries 0.928 on visits when it stands alone. Adding accommodation capacity cuts it to 0.265, still significant at 2.42, while capacity takes 0.826 at 7.53. Adding attention removes it entirely: the composite falls to minus 0.027 with a t statistic of minus 0.60, while attention takes 0.437 at 10.13 and capacity 0.592 at 14.30.

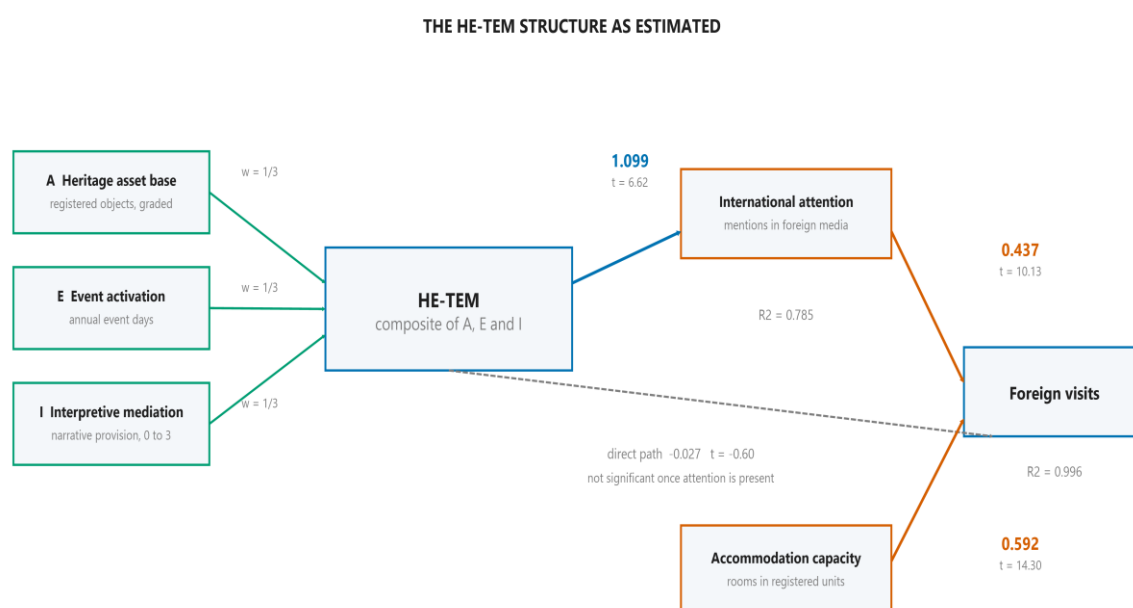


Figure 1. The HE-TEM structure as estimated. Coefficients are elasticities from the specifications in Tables 3, 4 and 5.

The mediation is complete in the conventional sense: the composite has no direct association with visits once its proximate outcome is in the equation. HE-TEM is a model of attention potential, and visits follow from attention jointly with capacity. This places the model precisely and also limits it: HE-TEM says nothing about the conversion of visits into revenue, and nothing in this estimation should be read as implying that it does.

4.5 Binding component and counterfactual

Table 6 reports the counterfactual described in 3.3.

Table 6. Binding component and the effect of raising it to the panel median

Region	HE-TEM	Binding component	HE-TEM after	Gain
Jizzakh	7.0	E activation	10.8	+54.3%
Namangan	15.1	I interpretation	18.3	+21.1%
Navoi	16.6	E activation	20.0	+20.5%
Karakalpakstan	24.9	E activation	29.3	+17.6%
Surkhandarya	20.6	E activation	23.7	+15.0%
Andijan	15.0	E activation	16.2	+8.4%
Samarkand	90.2	E activation	90.2	none
Bukhara	72.3	E activation	72.3	none
Tashkent city	53.7	A assets	53.7	none
Khorezm	48.9	A assets	48.9	none
Kashkadarya	28.3	E activation	28.3	none
Fergana	23.2	A assets	23.2	none
Tashkent region	21.4	A assets	21.4	none
Sirdarya	1.0	A assets	1.0	none

Panel medians are 21.5 for assets, 17.3 for activation and 25.8 for interpretation. Regions showing no gain already hold their binding component at or above the relevant median.

Six regions would gain, and the gains are concentrated: Jizzakh at 54.3 per cent, Namangan at 21.1, Navoi at 20.5 and Karakalpakstan at 17.6. In five of the six the binding component is event activation, which is the one of the three that policy can move on a short horizon. Assets cannot be created, and interpretation requires capital works and content development; an event calendar can be altered within a planning cycle.

The reading required by 4.3 must be attached here. Because the multiplicative form is not established over the additive one, the percentage gains in Table 6 are not predictions. They quantify how unbalanced each region's profile is, which is a descriptive fact, and they indicate where a complementarity-based allocation rule would direct funds if complementarity holds. An administrator persuaded by the additive form would read the same table differently, funding wherever the marginal cost per point is lowest regardless of which component it belongs to.

4.6 Discussion

The article set out to test two claims, and the outcome differs between them.

The measurement claim holds. The composite predicts attention at an elasticity of 1.099 and an R^2 of 0.785; its estimated component exponents sum to 1.039, indicating constant returns; and it retains an independent association with visits alongside accommodation capacity at 0.265. It also behaves sensibly in the ladder, in that the asset base alone explains 54.1 per cent of attention and is fully absorbed once activation enters, which is what the model predicts when a stock requires a flow to be activated.

The functional form claim does not hold, and it fails in two different ways that must not be conflated. The strict limiting form is rejected outright by the data, with a loss of 0.126 in R^2 . The complementarity claim proper is not rejected; it is untested, because the additive and multiplicative forms are separated by 0.011 in R^2 on a panel whose components correlate up to 0.905. Reporting these as one negative result would misstate both.

Three properties of the panel explain why the discrimination fails, and they generalise to most destination data. Components covary because they are jointly determined by the same regional development history: places with more heritage received more investment in interpretation and host more events. Balanced and unbalanced profiles are therefore not independently sampled, and only three of fourteen regions carry a meaningful imbalance. And fourteen units is a small number against a difference in fit of one per cent.

What would settle it is specifiable. A panel with a time dimension, observing the same regions before and after a change in one component, would break the covariation because the change is applied to one component and not the others. A cross-national panel would supply more units and, more importantly, a wider range of profiles, since the covariation between heritage stock and interpretive provision is a national policy artefact rather than a law. A deliberately stratified sample including cases of high assets with no interpretation and high interpretation with few assets would target the discriminating region of the space directly.

A further limitation follows from the composite indicator literature and is not remedied here. Saisana, Saltelli and Tarantola showed that composite rankings are frequently unstable under alternative normalisation and weighting choices, and require uncertainty and sensitivity analysis as a matter of

course [24]. This article varies the aggregation function, which is one of the three choices, and holds normalisation and weighting fixed at min-max and equal thirds. A full sensitivity analysis over all three would be the appropriate next methodological step, and until it is done the regional ordering in Table 2 should be treated as provisional.

Finally, the model as specified is a model of attention potential. The mediation result places it there unambiguously. Any use of HE-TEM to argue about revenue outcomes would exceed what has been estimated.

5. Conclusions and recommendations

5.1 Conclusions

This article developed the Heritage and Event Tourism Experience Model, integrating heritage asset base, event activation and interpretive mediation into a single composite, and tested it on the fourteen regions of Uzbekistan.

The composite is empirically coherent. It carries an elasticity of 1.099 on international attention with a t statistic of 6.62 and an R^2 of 0.785, and its three estimated component exponents sum to 1.039, which is constant returns to the composite.

The components cannot be separated on this panel. In the full specification all three exponents are individually insignificant, at minus 0.116, 0.599 and 0.556, while the equation explains 83.1 per cent of the variation. Intercorrelations run from 0.798 to 0.905. This is the empirical warrant for using HE-TEM as one index rather than as three independent levers.

The asset base does not survive activation. Alone it carries 0.922 and explains 54.1 per cent of attention; with event days present it falls to 0.082 with a t statistic of 0.29. A heritage stock produces attention through the activity staged on it.

The strict limiting form is rejected, losing 0.126 in R^2 . The additive and multiplicative forms cannot be distinguished, differing by 0.011. The model's complementarity claim is therefore unresolved rather than supported, and the article states the three data conditions that would resolve it.

Mediation through attention is complete. HE-TEM carries 0.265 on foreign visits alongside capacity and minus 0.027 with a t statistic of minus 0.60 once attention enters. The model is a model of attention potential and not of revenue.

Event activation is the binding component in eight of fourteen regions, assets in five and interpretation in one.

5.2 Recommendations

Adopt HE-TEM as an index, not as three separate targets. The collinearity result is not a nuisance to be corrected but the substantive finding that the three components move together in this system. Administrative targets set on one component alone will be met by movement in all three or in none.

Treat the composite as a measure of attention potential and evaluate it against attention. The mediation result is unambiguous. A region's HE-TEM score should be assessed against its international mentions, and its visitor performance should be assessed against attention and accommodation capacity jointly.

Prioritise event activation in the six regions where it binds and the deficit is large. Jizzakh, Navoi, Karakalpakstan, Surkhandarya and Andijan all bind on activation, and activation is the component that

a planning cycle can actually move. Namangan binds on interpretation and requires a different instrument.

Record interpretive provision as an administrative variable. The component is currently unmeasured in heritage administration, which means it cannot be allocated against. Its inclusion here rests on a score constructed for this study rather than on any official series.

References

1. Ritchie, J. R. B., & Crouch, G. I. (2003). *The Competitive Destination: A Sustainable Tourism Perspective*. Wallingford: CABI.
2. Crouch, G. I. (2011). Destination competitiveness: An analysis of determinant attributes. *Journal of Travel Research*, 50(1), 27-45.
3. Dwyer, L., & Kim, C. (2003). Destination competitiveness: Determinants and indicators. *Current Issues in Tourism*, 6(5), 369-414.
4. Leiper, N. (1979). The framework of tourism: Towards a definition of tourism, tourist, and the tourist industry. *Annals of Tourism Research*, 6(4), 390-407.
5. Gunn, C. A. (1972). *Vacationscape: Designing Tourist Regions*. Austin: Bureau of Business Research, University of Texas.
6. Smith, S. L. J. (1994). The tourism product. *Annals of Tourism Research*, 21(3), 582-595.
7. UNESCO (1972). *Convention Concerning the Protection of the World Cultural and Natural Heritage*. Paris: UNESCO.
8. ICOMOS (1964). *International Charter for the Conservation and Restoration of Monuments and Sites (The Venice Charter)*. Venice: ICOMOS.
9. Timothy, D. J., & Boyd, S. W. (2003). *Heritage Tourism*. Harlow: Prentice Hall.
10. Getz, D. (2008). Event tourism: Definition, evolution, and research. *Tourism Management*, 29(3), 403-428.
11. Getz, D., & Page, S. J. (2016). Progress and prospects for event tourism research. *Tourism Management*, 52, 593-631.
12. Chalip, L. (2004). Beyond impact: A general model for sport event leverage. In B. W. Ritchie & D. Adair (Eds.), *Sport Tourism: Interrelationships, Impacts and Issues* (pp. 226-252). Clevedon: Channel View.
13. Chalip, L. (2006). Towards social leverage of sport events. *Journal of Sport and Tourism*, 11(2), 109-127.
14. Tilden, F. (1957). *Interpreting Our Heritage*. Chapel Hill: University of North Carolina Press.
15. Ham, S. H. (2013). *Interpretation: Making a Difference on Purpose*. Golden: Fulcrum Publishing.
16. Moscardo, G. (1996). Mindful visitors: Heritage and tourism. *Annals of Tourism Research*, 23(2), 376-397.
17. ICOMOS (2008). *Charter for the Interpretation and Presentation of Cultural Heritage Sites*. Quebec: ICOMOS.
18. Pine, B. J., & Gilmore, J. H. (1998). Welcome to the experience economy. *Harvard Business Review*, 76(4), 97-105.
19. Mossberg, L. (2007). A marketing approach to the tourist experience. *Scandinavian Journal of Hospitality and Tourism*, 7(1), 59-74.

20. Cobb, C. W., & Douglas, P. H. (1928). A theory of production. *American Economic Review*, 18(1), 139-165.
21. Kremer, M. (1993). The O-ring theory of economic development. *Quarterly Journal of Economics*, 108(3), 551-575.
22. Leontief, W. W. (1941). *The Structure of American Economy, 1919-1929*. Cambridge: Harvard University Press.
23. OECD & Joint Research Centre (2008). *Handbook on Constructing Composite Indicators: Methodology and User Guide*. Paris: OECD Publishing.
24. Saisana, M., Saltelli, A., & Tarantola, S. (2005). Uncertainty and sensitivity analysis techniques as tools for the quality assessment of composite indicators. *Journal of the Royal Statistical Society: Series A*, 168(2), 307-323.
25. Bollen, K., & Lennox, R. (1991). Conventional wisdom on measurement: A structural equation perspective. *Psychological Bulletin*, 110(2), 305-314.
26. Diamantopoulos, A., & Winklhofer, H. M. (2001). Index construction with formative indicators: An alternative to scale development. *Journal of Marketing Research*, 38(2), 269-277.
27. Jarvis, C. B., MacKenzie, S. B., & Podsakoff, P. M. (2003). A critical review of construct indicators and measurement model misspecification in marketing and consumer research. *Journal of Consumer Research*, 30(2), 199-218.
28. Cameron, A. C., & Miller, D. L. (2015). A practitioner's guide to cluster-robust inference. *Journal of Human Resources*, 50(2), 317-372.